

SUMMARY AND CONCLUSIONS

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1. The study of air spora of college library of Karad, Dist. Satara, was carried out with the help of "Rotord Air Sampler".
2. The period of investigation was from 1st January, 1987 to 30th June 1987.
3. The total number of biopollutants trapped was 198185/m³.
4. During the period of investigation 61 components were recorded. Individual counts were taken for 56 named fungal spore types. The remaining other 5 were includes algal components, hyphal fragments, insect scales, xylem fibers and unidentified spores.
5. In 56 fungal spore types, 43 belonged to Deuteromycetes, 9 to Ascomycetes, 3 to Basidiomycetes, and 1 Phycomycete.
6. The air-spora composition, the groupwise order of dominance was as Deuteromycetes (49.125%). Basidiomycetes (44.450%), Phycomycetes (2.987%), Other types (1.806%) and Ascomycetes (1.629%)
7. Taking spore numbers into consideration the spores of smut, stand first with a percentage contribution (34.914%) to the total air spora. This is followed by Alternaria (9.884%), Uredospores (9.473%), Nigrospora (7.725%),

Helminthosporium (6.398%), Curvularia (5.908%),
Epicoccum (5.419%), Cladosporium (3.009%), Sclerospora
 Oospores (2.987%), Clasterosporium (1.445%) and others.

8. The group Phycomycete was represented by genus
Sclerospora whose oospores were recorded (2.987%)
 to the total air spora.

9. Ascomycetes group was represented by 9 spore types
 and Chaetomium contributed (0.711%) and was dominant
 in the group.

10. Amont the Basidiomycetes fungi smut spores were
 trapped in higher concentration (34.914%).

11. Deuteromycetes group was represented by 43 spore types
 and Alternaria contributed (9.884%), and was dominant
 in the group. It is followed by Nigrospora (7.725%),
Helminthosporium (6.398%), Curvularia (5.908%), and
Epicoccum (5.419%).

12. Among other types, unidentified spores contributed
 (1.155%) and showed dominance in this group.

13. During the present investigation, many allergenic
 fungal spores types are briefly discussed. They
 are as follows, Smut spores, Alternaria, Helminthosporium,
Curvularia, Epicoccum, Cladosporium, Chaetomium, Pleospora,

allergenic? ←

allergical?

Phoma, and Penicillium. This information would be of immense use for allergologists.

14. The mean concentration, percentage contribution and seasonal variations were observed for the spore types, during the period of investigation.

15. During this investigation, it can be clear that there was no "spore free" period in the library. From this study of air spora of library, it is clear that the air spora ^{or load} of the library is very rich in fungal spores with peak period in the month of June (25.626%) and their lowest concentration was in the month of February (10.866%).

concluded?

→ is this due to temperature + RH factors?

pl. disease - viva